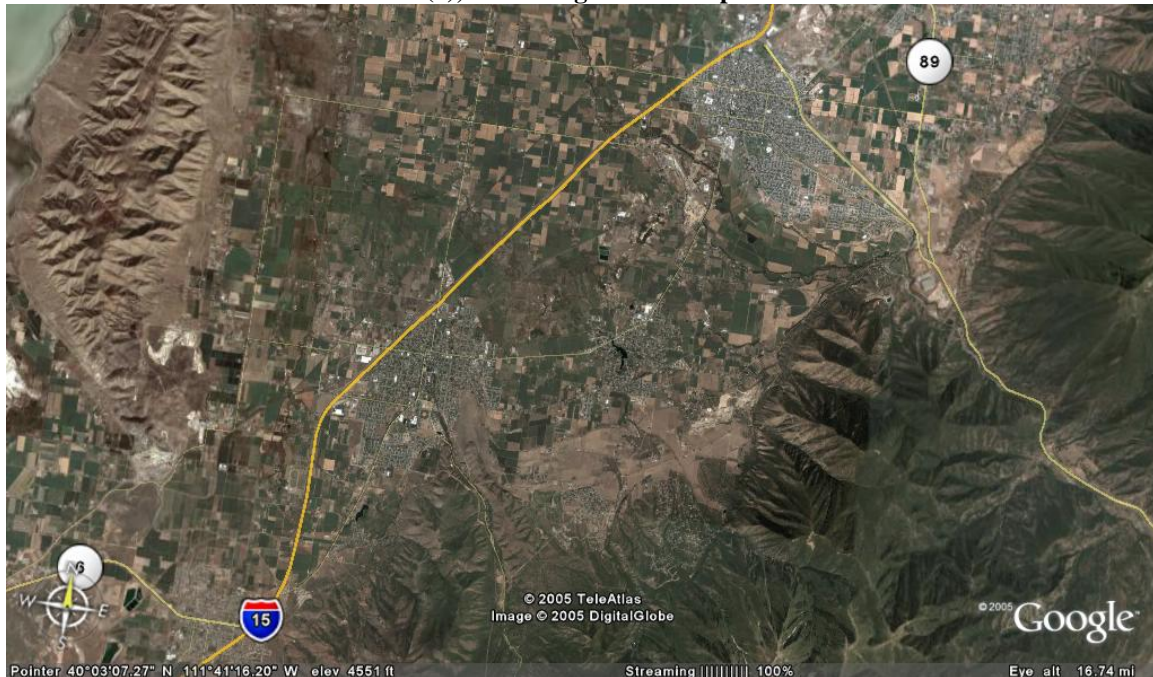


**Preliminary Structural Project Report
For
Bridge Decks Replacement Project
Spanish Fork to Santaquin
For**

Structure: F-104(2), I-15, Bridge over the Old Sugar Factory Spur

Structure: F-103(2), I-15, Bridge at the Leland Sugar Factory

Structure: F-102(2), I-15 Bridge over the Spanish Fork River



Project Manager:

Project Number:

PIN number:

CID number:

FY: 2009

UDOT

Structures Division

Region 3

Prepared by

Daniel Page

October 2005

Reviewed by Structures Group: January 9, 2006

REPORT SUMMARY

Scope of Project:

1. Purpose of Report

This report presents a conceptual overview of a project to replace bridge decks on I-15, from Spanish Fork to Santaquin. These bridges are located in Region 3 on mainline I-15. This report is intended to convey the need, scope, schedule, budget, safety, and quality control process for the project.

2. Project Information

Region: 3 **Route No.:** I-15, Region 3 **Date:** October 2005

Project Name: Bridge Deck Replacements, I-15, Spanish Fork to Santaquin

R.P.: 244.7 to 256.8

Project Number:

PIN:

CID:

Project Design: Bridge: UDOT Structures Division; Region 3 Pre-Construction

Project Mgr: John Clarkson #(801) 222-3411

3. Plan:

At this time there is a Preliminary EIS study in progress on Interstate 15 from 10600 South to Santaquin Main Street. Coordination with the finding of this study will have to be taken into consideration before design begins.

4. Work items to be completed:

- Remove and Replace Concrete Deck
- Beam End Repairs
- Column Repairs
- Abutment Backwall Repairs
- Bentcap Repairs
- Structural Steel Spot Cleaning and Overcoat

5. Work items to be deferred:

Roadway and safety items beyond what is related to the bridge repairs will not be included, this includes approach guardrail, and barrier standards.

6. Design Exceptions:

There is expected to bridge design exceptions required on the horizontal and vertical geometry, & shoulder widths..

7. Maintenance Considerations:

Region 3 Maintenance Station 3424 should be included in the concept development.

8. Construction Considerations:

Limitations of Operations, Incentives, A+B and other specifications should be considered when demolishing and replacing the bridge deck. It is recommended that work be done during off peak, nights, and weekends. Prefabricated deck panels should be evaluated based on similar bridge layouts through this area of Interstate 15.

9. Risk Analysis: (None anticipated at this time)

10. Development Process:

New or Major Reconstruction	<u> x </u>
Rehabilitation	<u> </u>
Preservation	<u> </u>

Schedule of Project:

To get the best quality and bid prices, it is expected that this project be advertised no later than **April 31, 2009**. Design should take no longer than one month. Construction should be completed in summer season. A tentative schedule is:

1.	Begin Design Phase	SPRING	2008
2.	Advertisement Date	FALL	2009
3.	Begin of Construction	SPRING	2009
4.	Completion of Construction	SUMMER/FALL	2009

Budget of Project:

1. **Funding Source:** **FY 2009 BR Funds & FY10 BF Funds in
Conjunction with Possible IM Funds**
2. **Amount Programmed:** **\$ 23,500,000**
3. **Cost Estimate:** **\$ 7,000,000**

The scope of this bridge project is to replace both bridge decks.

NORTH BOUND BRIDGES			
Item	Quantity	Unit	
<i>1F-104; 1.5 Miles SW Spanish Fork Interchange</i>			
Deck Replacement w/ Approach Slabs (w/sleeper Slabs)	9753	SF	
Beam Repair (Epoxy Injection)	2	EA	
Bent Cap Repair	2	EA	
Pedestal Repair	4	EA	
Column Repair	3	EA	
<i>1F-103; 1.7 Miles SW Spanish Fork Interchange</i>			
Deck Replacement w/ Approach Slabs (w/sleeper Slabs)	9753	SF	
Bent Cap Repair (Epoxy Injection)	2	EA	
Beam End Repair (Epoxy Injection)	5	EA	
<i>1F-102; 2.1 Miles SW of Spanish Fork Interchange</i>			
Deck Replacement w/ Approach Slabs (w/sleeper Slabs)	5741	SF	
Project Total			
			\$7,500,000

Location Map

